

Proceedings of the New York Entomological Society

(Meetings held in Room 129 of the American Museum of Natural History unless otherwise indicated)

Meeting of February 1, 1966

President Richard Fredrickson presided; 14 members and 2 guests were present. Miss Margaret Pogany was elected to membership and Mr. Howard Topoff, a graduate student at the City University, was proposed for student membership. Dr. Rozen introduced Dr. Herbert Ruckes, Jr., the son of our recently deceased Dr. Ruckes. He is a specialist in the Anobiidae (Coleoptera). Dr. Asher Treat proposed him for membership.

PROGRAM. **Blackflies of Western South America.** Dr. Pedro Wygodzinsky of the Museum staff discussed the biogeography of blackflies and the attempts by others and himself to find primitive genera in Western South America. Available evidence indicates that the more primitive forms are limited to the Northern Hemisphere. Thus, either the group originated in the Northern Hemisphere and radiated southward, or the primitive forms have died out in South America; this latter explanation does not seem likely. The talk was illustrated with specimens and slides.

DAVID C. MILLER, *Sec. pro tem.*

Meeting of February 15, 1966

Dr. Fredrickson presided; 25 members and 4 guests were present. Mr. John Pallister presented the report of the Auditing Committee for the year 1965 and stated that the Society's financial records are in proper order. Dr. Herbert Ruckes, Jr., and Mr. Howard Topoff were unanimously elected to full and student membership respectively. Mr. Aaron Nadler, a specialist in the Psocoptera who has done a great deal of collecting for the Museum, was proposed for membership. A note from Mrs. Herbert Ruckes, Sr. was read thanking the Society for the memorial resolution and the expression of sympathy which was sent to her on her husband's death. Miss Joan Todd, a grade school Biology teacher, was introduced as a guest.

PROGRAM. **A World Without Butterflies, and One Man's Fight to Delay It.** Dr. Kurt Gohla, Professor of German, Fordham University was the speaker of the evening. (An abstract follows.)

DAVID C. MILLER, *Sec. pro tem.*

A World Without Butterflies, and One Man's Fight to Delay It

On a visit to Germany during the summer of 1965, a collecting trip to Tegernsee, a mountain resort in the foothills of the Bavarian Alps, was made expressly to obtain the Black Apollo butterfly, *Parnassius mnemosyne* L. In spite of fertile mountain meadows, neither this species nor any other Lepidoptera were seen. An effort to explain the diminishing of butterflies and moths in this area is offered in a pamphlet issued by the Society for the Protection of Alpine Flowers and Animals. Three possible causes are under consideration by Doctor Max Dingler, Professor of Zoology at the University of Munich:

Atomic contamination by radioactive dust in the atmosphere which may have a sterilizing effect upon the reproductive organs of insects in general;

Electromagnetic sound waves which may interfere with the fine system of sense organs located in the antennae of the Lepidoptera;

The use of artificial fertilizers which have caused some wild flowering plants, preferred by butterflies, to disappear.

The disappearance of Lepidoptera from their customary mountain meadows and haunts constitutes a loss of ethical and esthetic values and would be an impoverishment of our entire social way of living.

Color slides were shown demonstrating the work of an amateur lepidopterist, Mr. Walther Ender of Lage, Westphalia, who breeds Lepidoptera in great numbers and releases them in order to repopulate the area of the Teutoburg Forest in the northwestern part of West Germany.

KURT GOHLA

Meeting of March 1, 1966

President Fredrickson called the meeting to order; 28 members and 10 guests were present. Mr. Aaron Nadler was elected to membership. Dr. Edwin W. Teale read excerpts from a letter he had received from Mr. Roy Latham, now 85 years old, telling of his experiences with lights to attract moths at Orient Point, Long Island. Almost none came to the lights and those that did were common ones; only very few other insects, such as Japanese beetles, are collected at lights. Dr. Pedro Wygodzinsky told of weevils from New Guinea that are covered with lichens and mosses in which mites are found.

PROGRAM. **Zoological Collecting in New Guinea.** Mr. Hobart M. Van Deusen, a curator in the Museum's Department of Mammology and in charge of the Archbold Collections, opened his talk by showing the pelts of some of the few mammals that are found in New Guinea: a bat with a wing spread of five feet; an arboreal, giant rat, the largest specimen which is a trifle short of three feet; a spiny anteater, and a tree-climbing kangaroo. All of the animals are nocturnal which makes collecting rather difficult. Since 1933 the Archbold expeditions have returned to New Guinea every 3 or 4 years. The last one in 1964 explored the Huon Peninsula where rift valleys separate mountain peaks into what are virtually islands. Remarkable slides were shown which gave excellent views of the terrain, mountain peaks, plateaus, and caves, as well as the mammals, including one of a kangaroo with young in its pouch.

LUCY M. HEINEMAN, Sec.

Meeting of March 15, 1966

Doctor Fredrickson presided; 17 members and 9 guests were present. Mr. John A. Novak was proposed for student membership. Miss Alice Gray exhibited specimens of wingless scorpion flies collected by a former student now at Ithaca. Dr. Asher Treat questioned a statement in a story on *Brachymeria intermedia*, a parasite of the Gypsy Moth (**New York Times**, Sunday, March 13, 1966), that these parasitic wasps do not sting humans. He reported having been stung several times by ichneumon wasps. Dr. Elsie Klots recounted a similar experience. The stings were painful but did not produce swellings or after-effects. He also called attention to an account by H. E. Hinton and M. S. Blum of the University of Bristol, England (**New Scientist**, Oct. 28, 1965, pp. 270-1) summarizing Hinton's experience with the larvae of the chironomid fly, *Polypedilum vanderplanki* (Hint.) which is able to produce apparently normal adults when restored to water after total dehydration and exposure, in the dry state, to temperatures as low as -270 degrees and as high as 104 degrees centigrade. The ability to survive alternate hydration and dehydration in this and in many more primitive organisms has suggested to the authors that life may have originated not in the sea, as is generally supposed, but in rock crevices or similar situations on land.

PROGRAM. **The Importation of Foreign Plant Material.** Mr. Charles A. Andrews of the Plant Quarantine Division of the U.S. Dept. of Agriculture discussed the need for restrictions on imported plants and plant materials, and he traced the history of our present regulations. He stressed the point that the Division has attempted to develop a plant pest protection program which will give us the maximum interference with commerce. The steps used in making inspections and the procedures in processing plants which enter our country from foreign propagators were outlined. Mr. Andrews showed slides depicting the carrying out of the restrictive provisions of the Division in the handling of tulip bulbs in Holland. Some showed the pests in bulbs and nuts, others were microscopic sections to explain how the identification of the pests are made.

LUCY M. HEINEMAN, *Sec.*

Meeting of April 5, 1966

President Fredrickson called the meeting to order; 14 members and 4 guests were present. Mr. John A. Novak was elected to student membership and Mr. Robert Mesibov was proposed for membership. Miss Alice Gray demonstrated a fossil arthropod which showed up well when illuminated with ultra-violet black light.

PROGRAM. **Fossil Roach-like Insects from the Carboniferous.** Mr. Christopher Durden of the Biology Department of Yale University discussed the distribution and the classification of the numerous roach-like fossils which are now available. Wing venation and their manner of folding are important features. Some had wing margins that might have been used for stridulation. Most of the Carboniferous roach fossils are about as large as our present roaches. The talk was illustrated with slides.

ALBERT J. POELZL, *Assistant Secretary*

Meeting of April 19, 1966

President Fredrickson presided; 31 members and 7 guests were present. Mr. Robert Mesibov was elected to student membership, and Miss Alice Gray proposed Mr. Kenneth Friedman and Mr. David F. Kanter for student memberships. Dr. Alexander Klots introduced Dr. and Mrs. Traub of Bethesda, Maryland. Dr. Traub, a former student at C.C.N.Y., a retired Army colonel, is an authority on fleas as typhus carriers. Miss Anne Birdsey called attention to an article on the science page of the Sunday **New York Times** written by Norton T. Novitt, a Denver, Colorado amateur scientist, which proposed that flying saucers may be electrified flying ants. She also showed a paperback copy of "1001 Answers About Insects" by Alexander and Elsie Klots. Dr. Klots announced that the Honorable Miriam Rothschild is now in the United States. Unfortunately, she was not able to stay in New York for tonight's meeting. She is currently engaged in a project concerning repellent insecticides which necessitates her using many specimens of the moth, *Diacrisia virginica*. She would appreciate having egg masses of this moth air-mailed to her at Elsfeld Manor, Oxford, England. Miss Alice Hopf is anxious to obtain specimens of the viceroy butterfly in any of its stages.

PROGRAM. **Termites and Evolutionary Processes.** Dr. Alfred E. Emerson, Professor Emeritus of the University of Chicago, a Research Associate in the Dept. of Insects of the Museum for many year, discussed regressive evolution, recapitulation, convergent evolution, and the evolution of behavior as illustrated by termites. He stressed that the unit of natural selection in these insects is the entire colony rather than the individual. The king and the queen are the only individuals in the colony capable of reproducing, and the genes controlling structural and adaptive characteristics which are manifested in the sterile castes,

the workers and the soldiers, are transferred through these reproductives; though they, themselves, do not manifest these characteristics. The talk was illustrated with slides.

Lucy M. Heineman, Sec.

Meeting of May 3, 1966

Dr. Fredrickson called the meeting to order; 15 members and 9 guests were present. Several guests were introduced: Mr. Harry Steen; Mrs. Michal Emsley of the New York Zoological Society Research Station, "Simla," in Trinidad; Dr. and Mrs. Leon Cahen who are active members of the Explorers Club. Mr. Kenneth Friedman and Mr. David Kanter were elected to student membership. Mr. Kenneth Watson, Mr. H. Steen, and Dr. Philip Spear were proposed for membership. Dr. Fredrickson mentioned that progress is being made on the proposed merger of the N.Y. and the Brooklyn Entomological Society. The lawyers for the two societies are in consultation and an agreement has been drawn up. The members will be kept informed about future developments and will be required to vote on the agreement after it has been approved by the Executive Committee of our Society. The President, also, announced that our member, Dr. Edwin Way Teale, received a Pulitzer Prize for his book, "**Wandering Through Winter**," the final volume of his history of the four seasons in America. The Secretary was instructed to convey to Dr. Teale the hearty congratulations of the Society on the receipt of this well-deserved honor.

PROGRAM. Entomology and the National Pest Control Operators. Dr. Philip Spear, Technical Director for the National Pest Control Association, explained that Pest Control operators are concerned with pests in and around structures, within the contents of the structures, and with the use and the problems of pesticides. Insects occupy a large part of the time and energy of the operators. Thus, entomology in all its phases is an important study in this industry. About 5,000 firms are members of the Association, and approximately 30,000 workers are employed in the field. They deal, usually, with emergency situations, but they do prefer to operate on a preventative basis. His talk was illustrated with many slides which showed the scope of work done in structures, the damages done by various pests, and the pests.

Lucy M. Heineman, Sec.

Meeting of May 17, 1966

President Fredrickson presided; 27 members and 21 guests were present. One of the guests present was Dr. John Vandenburg of the New York University Medical School, Dept. of Preventive Medicine. Mr. Kenneth Watson, Mr. Harry Steen, and Dr. Philip Spear were elected to membership. Dr. James Forbes, Associate Editor of the Journal, reported on the 10th Annual Meeting of the Council of Biological Editors which was held May 3-4 in the Center for Continuing Education on the campus of Notre Dame University. Dr. Forbes represented the Society at this meeting. Dr. Klots read a letter from the Edwin W. Teales in which he thanked the Society for its good wishes and described happenings on their trip through England. Dr. Fredrickson reported that on the proposed merger of our Society with the Brooklyn Entomological Society it will probably be necessary to call for a special meeting in order to vote on the final agreement. Notices will inform the membership.

PROGRAM. National Geographic Society Motion Picture on the work being done by Dr. L. S. B. Leaky in finding human fossil remains in the Oldvai Gorge in Africa; filmed by Baron Hugo van Lavick. This was accompanied by a recorded, running commentary by Dr. Leaky. It was a fascinating film showing the work camps, the terrain, and how the fossils were found. It supported Dr. Leaky's theory that there were two contemporary

types of man, herbivorous and carnivorous. The film demonstrated differences between the mouthparts and the feeding of these two types of animals. The photography of insects and the feeding of the different forms was superb.

Lucy M. Heineman, Sec.

Recent Publications

- Aspects of Insect Biochemistry.** 1965. Biochemical Society Symposium (London), T. W. Goodwin, Ed. Academic Press, New York, 119 pp., illus., \$6.00. Seven papers: "Active Transport in Insects" by J. E. Treherne; "Formation of the Specific Structural and Enzymic Pattern of the Insect Flight Muscle" by Th. Bücher; "Some Distinctive Features of Insect Metabolism" by F. P. W. Winteringham; "Intermediary Metabolism and the Insect Fat Body" by B. A. Kilby; "The Metabolism of Aromatic Compounds" by P. C. J. Brunet; "Hormones Controlling Growth and Development in Insects" by V. B. Wigglesworth; and "Skeletal Structure in Insects" by K. M. Rudall.
- Pesticides in Clinical Practice, Identification, Pharmacology and Therapeutics.** 1966. Royal L. Brown. Charles C. Thomas, 504 pp., \$15.75.
- The Entomology of Radiation Disinfection of Grain.** 1966. Edited by P. B. Cornwall. Pergamon Press, Long Island City, New York, 256 pp., \$9.50.
- Ticks of the Genus Ixodes in Africa.** 1966. Don R. Arthur. University of London Press, London: Oxford University Press, New York, 365 pp., \$11.20. Reviewed in *Science* **152**: No. 3723, p. 750.
- Polymorphism in Some Nearctic Halictine Bees.** 1966. G. Knerer and C. E. Atwood. *Science* **152**: 1262-1263.
- Classification of the Bees of the Australian and South Pacific Regions.** 1965. Charles D. Michener. American Museum of Natural History Bulletin, **130**: 1-362, \$10.00.
- Termites (Isoptera) of Thailand.** 1965. Muzaffer Ahmad. American Museum of Natural History Bulletin, **131**: 1-114, \$2.00.
- Insect Aerodynamics: Vertical Sustaining Force in Near Hovering Flight.** 1966. Leon Bennet. *Science*, **152**: 1263-1266.
- A Revision of the Neotropical Genus *Metamasius* (Coleoptera: Curculionidae, Rhynchophorinae): Species Groups I and II.** 1966. Patricia Vaurie. American Museum of Natural History Bulletin, **131**: 211-338, \$5.00.
- Contributions Towards a Revision of *Myrsidea* Waterson I (Mallophaga: Menoponidae).** T. Clay. British Museum (Natural History) Bulletin: Entomology, **17**: 327-395, 1£ 10s.
- A Revision of the British Aleyrodidae (Hemiptera: Homoptera).** L. A. Mound. British Museum (Natural History) Bulletin: Entomology, **17**: 397-428, (14s).
- The Interrelationships of Three Gall Makers and Their Natural Enemies, on Hackberry (*Celtis occidentalis* L.).** John Conrad Moser. 95 pp., \$1.00.
- A Handbook for the Identification of Insects of Medical Importance.** 1965. John Smart with chapters by Karl Jordon and R. J. Whittick. British Museum (Natural History), London, 4th ed., 340 pp., £3. Reviewed in *Science*, **152**: 748-749.